United States Patent [19]

Ridings et al.

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[54] AEROSOL DELIVERY ARTICLE

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[51] Int. Cl.[5] A24D 1/00; A24D 1/18

[52] U.S. Cl. 131/194; 131/271; 131/273; 131/360; 128/200.14

[58] Field of Search 131/194, 270, 271, 273, 131/360, 359; 128/200.14

[56] References Cited

U.S. PATENT DOCUMENTS

2,104,266	1/1938	McCormick .	
3,258,015	6/1966	Ellis et al. .	
3,683,936	8/1972	O'Neil, Jr. .	
4,149,548	4/1979	Bradshaw .	
4,284,089	8/1981	Ray .	
4,393,884	7/1983	Jacobs .	
4,774,971	10/1988	Vieten .	

FOREIGN PATENT DOCUMENTS

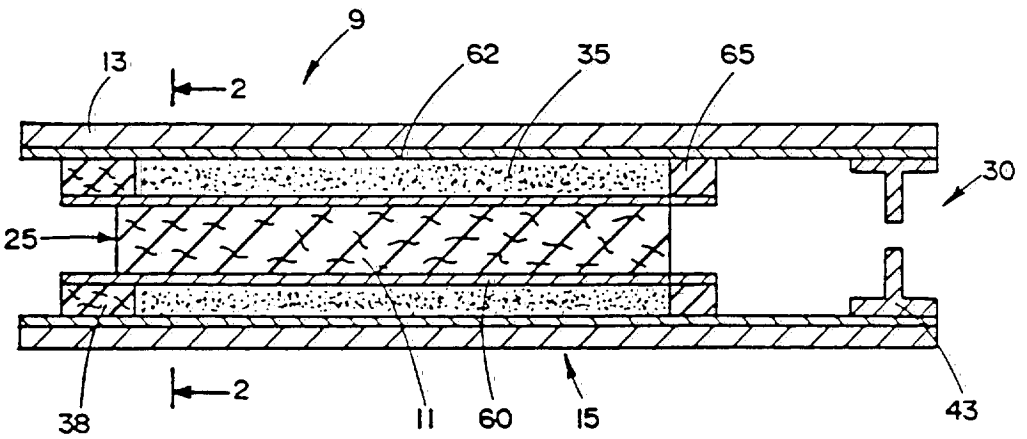
276250	6/1967	Australia .
86/02528	5/1986	PCT Int'l Appl. .

Primary Examiner—V. Millin

[57] ABSTRACT

An aerosol delivery article provides flavor or a dose of a drug by heating a flavor or a drug, but not burning any material. A heat source which includes granular magnesium, granular iron, and finely divided cellulose generates heat upon contact thereof with an aqueous solution of potassium chloride. The heat source is in a heat exchange relationship with the flavor or drug. Heat generated by the heat source heats the flavor or drug in a controlled manner. The flavor or drug volatilizes and is drawn into the mouth of the user of the article. Typical heat sources heat the flavor or drug to a temperature within about 70° C. to about 180° C. for 4 to 8 minutes.

23 Claims, 2 Drawing Sheets



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